



# *X-Plain™*

## *Fibromyalgia*

### **Reference Summary**

Fibromyalgia is a common condition that causes pain and fatigue in the muscles, joints, ligaments and tendons. Fibromyalgia affects about 3-6 million Americans.

Fibromyalgia has a widespread range of symptoms, and its causes are not well understood.

This reference summary explains fibromyalgia and how it is diagnosed and treated. Included are healthy living tips for managing fibromyalgia.

### **Fibromyalgia**

Fibromyalgia syndrome is a common and chronic disorder characterized by widespread muscle pain, fatigue, and multiple tender points.

The word *fibromyalgia* comes from the Latin term for fibrous tissue (*fibro*) and the Greek ones for muscle (*myo*) and pain (*algia*). Tender points are specific places on the body—on the neck, shoulders, back, hips, and upper and lower extremities—where people with fibromyalgia feel pain in response to slight pressure.

Fibromyalgia can cause significant pain and fatigue, and it can interfere with a person's ability to carry on daily activities.

Fibromyalgia is a chronic condition, which means it is ongoing. Even though the pain, the fatigue and other symptoms may get worse with time, there is no obvious damage or inflammation in the muscles or internal organs. Fibromyalgia is not fatal.

Fibromyalgia is common between the ages of 35 and 55. About 80% of those affected are women.

### **Symptoms**

The most common symptoms of fibromyalgia are pain throughout the body and a feeling of fatigue.

The muscles affected most are usually those in the shoulders, buttocks, neck, and lower back. The pain in these areas seems to originate from specific tender points.

Fibromyalgia pain can be made worse by factors such as stress, weather changes, loud noises, and anxiety.

Up to 90% of fibromyalgia patients feel tired all the time.

Many patients experience other symptoms that can be mild or severe, and may come and go.

These symptoms include:

- sleep disturbances
- morning stiffness
- headaches
- irritable bowel syndrome, Irritable bowel syndrome includes digestive problems such as difficulty swallowing, heartburn, gas, abdominal pain, diarrhea, and constipation
- painful menstrual periods
- numbness or tingling of the extremities
- restless legs syndrome
- temperature sensitivity,
- cognitive and memory problems (sometimes referred to as "fibro fog"), or
- a variety of other symptoms

Fibromyalgia patients may have trouble sleeping, which may add to feeling fatigued.

Headaches and jaw pain are common. Patients may have dry eyes or difficulty focusing on nearby objects.

Many patients are very sensitive to odors, bright lights, loud noises, various foods, changes in weather, and medicines.

Patients may have feelings of numbness or tingling in parts of the body, such as the legs or feet.

Some patients have urinary problems, including frequent urination, a strong urge to urinate, or pain in the bladder. Women with fibromyalgia may have pelvic pain, painful menstrual periods, or painful sexual intercourse.

Some patients with fibromyalgia may feel dizzy.

Depression or anxiety may occur with fibromyalgia due to ongoing pain and fatigue, frustration with the condition, or a chemical imbalance in the brain.

## **Causes**

The causes of fibromyalgia are not well understood. Doctors believe there may be several causes. Fibromyalgia may be caused by chemical changes in the brain.

Some researchers have found elevated levels of certain chemicals in the spinal fluid of fibromyalgia patients. Other chemicals, like serotonin, may be low in fibromyalgia patients.

Some researchers believe abnormal sleep is a cause of fibromyalgia rather than a symptom of it! Patients with fibromyalgia seem to lack a phase of sleep known as non-REM, or non-rapid-eye-movement sleep, which is very important in restoring energy.

Researchers also believe that fibromyalgia might be caused by stress, infections, or injuries.

Fibromyalgia is also commonly seen in patients who have other diseases such as rheumatoid arthritis and lupus.

Research is being conducted to try to determine if there is a genetic basis for the disease, as it tends to run in families.

## **Diagnosis**

Symptoms of fibromyalgia are similar to symptoms of other muscle, joint, and gland diseases. Fibromyalgia is diagnosed only after other diseases with similar symptoms are ruled out.

First, a detailed history and thorough physical examination are done.

Blood work and radiological tests, such as x-rays, may be done to make sure patients do not have a

- hormonal imbalance
- muscle disease

- nerve disease
- joint disease
- bone disease
- infection
- cancer

Electrical nerve and muscle testing known as EMG, or ElectroMyoGraphy, and NCV, or Nerve Conduction Velocity, may also be done to check the muscles and nerves.

There are currently no diagnostic laboratory tests for fibromyalgia; standard laboratory tests fail to reveal a physiologic reason for pain.

Because there is no generally accepted, objective test for fibromyalgia, some doctors unfortunately may conclude a patient's pain is not real, or they may tell the patient there is little they can do.

A doctor familiar with fibromyalgia, however, can make a diagnosis based on two criteria established by the American Academy of Rheumatology or ACR:

A history of widespread pain lasting more than 3 months and the presence of tender points.

Pain is considered to be widespread when it affects all four quadrants of the body; that is, you must have pain in both your right and left sides as well as above and below the waist to be diagnosed with fibromyalgia.

The ACR also has designated 18 sites on the body as possible tender points. For a fibromyalgia diagnosis, a person must have 11 or more tender points.

One of these predesignated sites is considered a true tender point only if the person feels pain upon the application of 4 kilograms of pressure to the site. People who have fibromyalgia certainly may feel pain at other sites, too, but those 18 standard possible sites on the body are the criteria used for classification.

## **Treatment**

There is no cure for fibromyalgia. Treatment consists of managing the symptoms through medication and improving general health. Alternative medicine may also be helpful for some patients.

Fibromyalgia treatment often requires a team approach, with your doctor, a physical therapist, possibly other health professionals, and most importantly, yourself, all playing an active role.

It can be hard to assemble this team, and you may struggle to find the right professionals to treat you. When you do, however, the combined expertise of these various professionals can help you improve your quality of life.

Following are some of the most commonly used categories of drugs for fibromyalgia:

### *Analgesics*

Analgesics are painkillers. They range from over-the-counter acetaminophen (Tylenol®) to prescription medicines, such as tramadol (Ultram®), and even stronger narcotic preparations.

For a subset of people with fibromyalgia, narcotic medications are prescribed for severe muscle pain. However, there is no solid evidence showing that narcotics actually work to treat the chronic pain of fibromyalgia, and most doctors hesitate to prescribe them for long-term use because of the potential that the person taking them will become physically or psychologically dependent on them.

### *Nonsteroidal Anti-Inflammatory Drugs (NSAIDs)*

As their name implies, nonsteroidal anti-inflammatory drugs, including aspirin, ibuprofen (Advil®, Motrin®), and naproxen sodium (Anaprox, Aleve), are used to treat inflammation.

Although inflammation is not a symptom of fibromyalgia, NSAIDs also relieve pain. The drugs work by inhibiting substances in the body called prostaglandins, which play a role in pain and inflammation.

These medications, some of which are available without a prescription, may help ease the muscle aches of fibromyalgia. They may also relieve menstrual cramps and the headaches often associated with fibromyalgia. They should however be used under your physician's supervision, especially that recent data has implicated long term use of NSAIDs in an increase risk of strokes and heart attacks.

*Antidepressant medications.* Antidepressants correct brain and spinal cord chemical imbalances to stop pain and restore normal sleeping patterns.

Doses of antidepressants for fibromyalgia are usually much smaller than what is taken for depression.

Benzodiazepines help some people with fibromyalgia by relaxing tense, painful muscles and stabilizing the erratic brain waves that can interfere with deep sleep.

Benzodiazepines also can relieve the symptoms of restless legs syndrome, which is common among people with fibromyalgia. Restless legs syndrome is characterized by unpleasant sensations in the legs as well as twitching, particularly at night.

Because of the potential for addiction, doctors usually prescribe benzodiazepines only for people who have not responded to other therapies. Benzodiazepines include clonazepam (Klonopin®) and diazepam (Valium®).

People with fibromyalgia also may benefit from a combination of physical and occupational therapy, from learning pain-management and coping techniques, and from properly balancing rest and activity.

Many people with fibromyalgia also report varying degrees of success with complementary and alternative therapies, including massage, movement therapies (such as Pilates and the Feldenkrais method), chiropractic treatments, acupuncture, and various herbs and dietary supplements for different fibromyalgia symptoms.

Though some of these supplements are being studied for fibromyalgia, there is little, if any, scientific proof yet that they help.

If you are using or would like to try a complementary or alternative therapy, you should first speak with your doctor, who may know more about the therapy's effectiveness, as well as whether it is safe to try in combination with your medications.

## **Self-Care**

Patients with fibromyalgia have chronic fatigue that leads to stress and sleep disturbances. Helping patients know how to live healthier lives is critical for reducing stress, improving sleep, increasing energy, and decreasing pain.

Healthy living and self-care consists of a program to:

- reduce stress
- sleep well
- exercise regularly
- eat healthy
- manage symptoms

## **Reduce Stress**

Avoid situations that cause you stress.

Take time to relax. Learn relaxation techniques such as breathing exercises, guided imagery, and meditation.

## **Sleep Well**

Go to bed early.

Avoid caffeine, especially before going to bed.

Get a comfortable mattress.

Avoid alcoholic beverages.

## **Exercise Regularly**

Stretch when you wake up.

Low-impact aerobic exercises such as walking, swimming, and stationary bicycling can be very helpful.

Exercise regularly for at least 3 half-hour sessions per week.

The first few times you exercise, you may feel pain. With time, pain will become less severe.

## **Eat Healthy**

Avoid caffeine, alcoholic beverages, and candy.

Take vitamins under your doctor's supervision or eat vitamin-enriched cereals.

Eat a balanced diet.

If you smoke, quit!

## **Manage Symptoms**

Treat symptoms as they arise. For example, if you feel you have dry eyes, use eye drops. They are available over-the-counter.

## **Massage Therapy**

Massage involves the practitioner moving muscles and underlying tissues mostly with his or her hands. There are various types of massage, including Swedish, deep connective tissue, and Shiatsu massage.



The main goals of massage therapy are to

- increase blood circulation
- loosen sore muscles
- remove toxins from muscles
- align muscles and joints that are misaligned
- increase the flow of nutrients



Massage helps to relieve stress and anxiety. You should avoid it if you have open sores, or circulatory problems such as blood clots.

### ***Acupressure***

In acupressure, the practitioner applies pressure with his or her fingers at certain points in the body.

The aim of acupressure is to restore flow of energy in invisible life force pathways under the skin. Acupressure is based on the belief that illness is caused when the flow of energy through these pathways is disrupted.

### ***Acupuncture***

Acupuncture is like acupressure and based on the same beliefs. However, instead of applying pressure, the acupuncture practitioner inserts very small needles at certain points of the body to restore the flow of energy.

### ***Trigger Point Therapy***

In trigger point therapy, a therapist applies sustained pressure for few minutes at a time, at specific trigger points. Trigger points are points in the body where muscle pain begins.

### ***Chiropractic Care***

The goal of chiropractic care is to realign the vertebrae of the spine. A chiropractor stretches vertebrae to relieve pressure from nerves and to allow the body to heal itself. It is based on the belief that certain illnesses are caused by misaligned vertebrae.

### ***Summary***

Fibromyalgia is a common condition that causes pain and fatigue in the muscles, joints, ligaments and tendons.



There is no cure for fibromyalgia. Treatment consists of managing the symptoms with medication and improving general health through self-care. Complementary Medicine may also be helpful for some patients.

Since fibromyalgia has no visible symptoms, it is often misunderstood. Helping patients and their friends understand the condition makes coping easier.

Stress management techniques, exercises, and medications help fibromyalgia patients cope with pain and get their lives back!